

**Notice of Allowability**

Application No.

10/705,672

Examiner

William H. Mayo III

Applicant(s)

CLARK, WILLIAM T.

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**-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address--**

All claims being allowable, PROSECUTION ON THE MERITS IS (OR REMAINS) CLOSED in this application. If not included herewith (or previously mailed), a Notice of Allowance (PTOL-85) or other appropriate communication will be mailed in due course. **THIS NOTICE OF ALLOWABILITY IS NOT A GRANT OF PATENT RIGHTS.** This application is subject to withdrawal from issue at the initiative of the Office or upon petition by the applicant. See 37 CFR 1.313 and MPEP 1308.

1. ☒ This communication is responsive to July 10, 2006.
2. ☒ The allowed claim(s) is/are 7-9 and 11-30.
3. ☒ The drawings filed on 06 May 2005 are accepted by the Examiner.
4. ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).  
a) ☐ All b) ☐ Some\* c) ☐ None of the:  
1. ☐ Certified copies of the priority documents have been received.  
2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.  
3. ☐ Copies of the certified copies of the priority documents have been received in this national stage application from the International Bureau (PCT Rule 17.2(a)).

\* Certified copies not received: \_\_\_\_\_.

Applicant has THREE MONTHS FROM THE "MAILING DATE" of this communication to file a reply complying with the requirements noted below. Failure to timely comply will result in ABANDONMENT of this application.

**THIS THREE-MONTH PERIOD IS NOT EXTENDABLE.**

5. ☐ A SUBSTITUTE OATH OR DECLARATION must be submitted. Note the attached EXAMINER'S AMENDMENT or NOTICE OF INFORMAL PATENT APPLICATION (PTO-152) which gives reason(s) why the oath or declaration is deficient.
6. ☐ CORRECTED DRAWINGS (as "replacement sheets") must be submitted.  
(a) ☐ including changes required by the Notice of Draftsperson's Patent Drawing Review (PTO-948) attached  
1) ☐ hereto or 2) ☐ to Paper No./Mail Date \_\_\_\_\_.  
(b) ☐ including changes required by the attached Examiner's Amendment / Comment or in the Office action of Paper No./Mail Date \_\_\_\_\_.
- Identifying indicia such as the application number (see 37 CFR 1.84(c)) should be written on the drawings in the front (not the back) of each sheet. Replacement sheet(s) should be labeled as such in the header according to 37 CFR 1.121(d).
7. ☐ DEPOSIT OF and/or INFORMATION about the deposit of BIOLOGICAL MATERIAL must be submitted. Note the attached Examiner's comment regarding REQUIREMENT FOR THE DEPOSIT OF BIOLOGICAL MATERIAL.

**Attachment(s)**

- |   |  |
|---|--|
| 1. <input type="checkbox"/> Notice of References Cited (PTO-892)  | 5. <input type="checkbox"/> Notice of Informal Patent Application (PTO-152)            |
| 2. <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948)                                | 6. <input type="checkbox"/> Interview Summary (PTO-413),<br>Paper No./Mail Date _____. |
| 3. <input type="checkbox"/> Information Disclosure Statements (PTO-1449 or PTO/SB/08),<br>Paper No./Mail Date _____ | 7. <input type="checkbox"/> Examiner's Amendment/Comment                               |
| 4. <input type="checkbox"/> Examiner's Comment Regarding Requirement for Deposit<br>of Biological Material          | 8. <input checked="" type="checkbox"/> Examiner's Statement of Reasons for Allowance   |
|   | 9. <input type="checkbox"/> Other _____.   |

## **DETAILED ACTION**

### ***Continued Examination Under 37 CFR 1.114***

1. A request for continued examination under 37 CFR 1.114, including the fee set forth in 37 CFR 1.17(e), was filed in this application after allowance or after an Office action under *Ex Parte Quayle*, 25 USPQ 74, 453 O.G. 213 (Comm'r Pat. 1935). Since this application is eligible for continued examination under 37 CFR 1.114, and the fee set forth in 37 CFR 1.17(e) has been timely paid, prosecution in this application has been reopened pursuant to 37 CFR 1.114. Applicant's submission filed on July 10, 2006 has been entered.

### ***Information Disclosure Statement***

2. The information disclosure statement filed July 10, 2006 has been submitted for consideration by the Office. It has been placed in the application file and the information referred to therein has been considered.

### ***Allowable Subject Matter***

3. Claims 7-9 and 11-30 are allowed.
4. The following is an examiner's statement of reasons for allowance: This invention deals with a shielded cable comprising a plurality of twisted pairs of insulated conductors, a core disposed between the plurality of twisted pairs of insulated conductors, wherein a dual jacket encloses the core and the plurality of twisted pairs of

insulated conductors, wherein the dual jacket includes first and second jacket layers with a shield disposed between the first and second jacket layers, wherein at least one of the first and second jacket layers comprises a plurality of protrusions (claim 7). This invention also deal with a bundled cable comprising a first cable comprising a plurality of twisted pairs of insulated conductors and a first separator arranged between the plurality of twisted pairs so as to separate one of the plurality of twisted pairs from others of the plurality of twisted pairs, wherein the first cable has a first jacket, a second cable having a second jacket, wherein each of the first and second jackets comprise a plurality of protrusions, wherein the plurality of protrusions of the first jacket are inwardly projecting and having a first spacing sufficiently small so as to prevent any one of the plurality of twisted pairs of insulated conductors from lying between adjacent ones of the plurality of protrusions (claim 9). This invention also deal with a bundled cable comprising a first cable comprising a plurality of twisted pairs of insulated conductors and a first separator arranged between the plurality of twisted pairs so as to separate one of the plurality of twisted pairs from others of the plurality of twisted pairs, wherein the first cable has a first jacket, a second cable having a second jacket, wherein each of the first and second jackets comprise a plurality of protrusions, wherein the plurality of protrusions of the first jacket are outwardly projecting and having a first spacing sufficiently small so as to prevent any one of the plurality of twisted pairs of insulated conductors from lying between adjacent ones of the plurality of protrusions (claim 12). This invention also deal with a cable comprising a plurality of twisted pairs of insulated conductors including a first twisted pair and a second twisted pair, a core disposed

between the plurality of twisted pairs of insulated conductors so as to separate the first twisted pair from the second twisted pair, wherein the first and second twist lays and the first and second nominal impedances are selected such that a skew between the first and second twisted pairs is less than about 21 nanoseconds per 100 meters and a difference between the first and second nominal impedances is between approximately 2 Ohms and 15 Ohms (claim 15). This invention also deals with a plurality of twisted pairs of insulated conductors, a separator arranged between the plurality of twisted pairs so as to separate one of the plurality of twisted pairs from others of the plurality of twisted pairs; and a first jacket surrounding the plurality of twisted pairs and the separator; and a second jacket surrounding the first jacket, wherein at least one of the first jacket and the second jacket comprises a plurality of protrusions extending away from a surface of the respective one of the first jacket and the second jacket (claim 21). This invention also deals with a bundle cable comprising a first cable including a plurality of twisted pairs of insulated conductors and a first jacket, wherein the first jacket including a first plurality of projections extending outwardly from an outer surface of the first jacket; a second cable including a plurality of twisted pairs of insulated conductors and a second jacket, the second jacket including a second plurality of outwardly projecting protrusions; wherein the first cable is twisted in a helical manner with a first cable lay so as to provide a first twisted cable; wherein the second cable is twisted in a helical manner with a second cable lay so as to provide a second twisted cable', and wherein the bundled cable further comprises an overall jacket surrounding the first and second twisted cables along a length of the bundled cable (claim 29). The

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above stated claim limitations, in combination with other claim limitations, is not taught or suggested by the prior art of record. While many of the prior art references disclose separators, and Newmoyer et al (Pat Num 5,796,046) disclose the jacket comprising a plurality of protrusions extending away from an inner circumferential surface of the jacket, none of the prior art discloses utilizing the separator with the jacket having a plurality of protrusions extending away from an inner circumferential surface of the jacket.

One may argue that the teaching of Newmoyer can be combined with any of the prior art references which teach utilizing a spacer, however such a combination would not be obvious to one of ordinary skill in the art, because the plurality of protrusions extending away from an inner circumferential surface of the jacket and the separator perform the same function. The MPEP states:

III. >< FACT THAT REFERENCES CAN BE COMBINED OR MODIFIED IS  
NOT SUFFICIENT TO ESTABLISH PRIMA FACIE OBVIOUSNESS

The mere fact that references can be combined or modified does not render the resultant combination obvious unless the prior art also suggests the desirability of the combination.

In re Mills, 916 F.2d 680, 16 USPQ2d 1430 (Fed. Cir. 1990) (Claims were directed to an apparatus for producing an aerated cementitious composition by drawing air into the cementitious composition by driving the output pump at a capacity greater than the feed rate. The prior art reference taught that the feed means can be run at a variable speed, however the court found that this does not require that the output pump be run at the claimed speed so that air is drawn into the mixing chamber and is entrained in the ingredients during operation. Although a prior art device "may be capable of being modified to run the way the apparatus is claimed, there must be a suggestion or

motivation in the reference to do so." 916 F.2d at 682, 16 USPQ2d at 1432.). See also In re Fritch, 972 F.2d 1260, 23 USPQ2d 1780 (Fed. Cir. 1992) (flexible landscape edging device which is conformable to a ground surface of varying slope not suggested by combination of prior art references).

Specifically, all of the cited prior art that disclose the spacer (absent the protrusion extending away from the outer jacket) teach doing so to provide separation between adjacent conductor pairs from each other to reduce cross talk. Newmoyer teaches utilizing the protrusions (absent the spacer) extending away from the outer jacket for providing separation between adjacent conductor pairs to reduce cross talk. Based on the overall teachings of the prior art records, reducing cross talk is achieved by utilizing either the spacer or protrusions within an outer jacket, and there exist no motivation to combine the teachings of Newmoyer with any prior art references utilizing the spacer because none of the references teaches or suggest any other motivation for providing additional spacing between the adjacent conductors to prevent cross talk. Therefore, the claims have been allowed.

Any comments considered necessary by applicant must be submitted no later than the payment of the issue fee and, to avoid processing delays, should preferably accompany the issue fee. Such submissions should be clearly labeled "Comments on Statement of Reasons for Allowance."

### ***Communication***


5. Any inquiry concerning this communication or earlier communications from the examiner should be directed to William H. Mayo III whose telephone number is (571)-

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272-1978. The examiner can normally be reached on M-F 8:30am-6:00 pm (alternate Fridays off).

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Dean Reichard can be reached on (571) 272-2800 ext 31. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

  
William H. Mayork  
Primary Examiner  
Art Unit 2831

WHM III  
July 14, 2006